

CALSIM II

Water Resources Simulation Model for SWP/CVP Operations

What is CALSIM II?

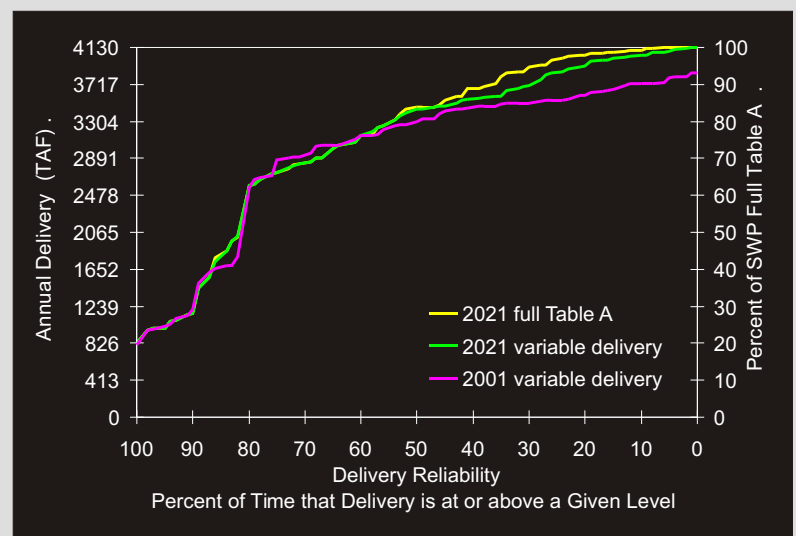
Statewide planning model
Simulates operations of SWP and CVP facilities, under a Coordinated Operations Agreement, on a monthly time-step
Represents the Sacramento and San Joaquin River system and Delta
Accounts for system operational objectives, physical constraints, legal and institutional agreements and statutes such as:

- USACE flood control guidelines and navigation flows
- Channel, outlet and pump capacities
- SWRCB Decisions, NMFS fish protections and biological opinions

Uses 73 years of historical water conditions (1922 – 1994), which are modified to reflect a certain (fixed) level of development.
Allocates a limited resource (water) for various competing uses (agricultural, municipal, industrial, environmental, and recreational), given a set of system constraints (physical, legal, and institutional).
Applies specifically to the California water system.
Respects supply priorities between senior water rights holders, settlement of exchange contractors, and SWP and CVP water service contractors.

Intended use of Model

Tool to determine water supply impacts due to changes in system configuration, operations decisions, and/or regulatory requirements.



SWP Delivery Reliability

Why use CALSIM II?

Addresses many Oroville obligations throughout the state (local demands, Feather River minimum flows, Delta water quality, exports to SWP contractors, etc.).
Assesses operational objectives over a long-term planning horizon (73 years of simulation).
Evaluates potential water supply impacts throughout the State using a comparative analysis process.

User Interface: Study Control

The screenshot shows the 'CALSIM' software interface with various input fields and buttons. Key fields include 'Study Name', 'Author', 'Date', 'Description', 'WRESL File', 'SV File', 'DV File', 'Init File', and 'Init File F-part'. There are also dropdown menus for 'Start Date', 'Stop Date', and 'Sim Option'.

Study Name (DV and SV DSS F-part)

Study Description

Main WRESL File

Input time series data file (SV.DSS)

Output time series file (DV.DSS)

Initial conditions file (INIT.DSS)

INIT DSS File F-part

User interface to setup model runs and view both input and output data.



California's Major Water Projects